

We Claim

1. A method of injecting gasification medium into particle-loaded gasification spaces of fixed-bed, fluidized-bed or entrained-bed gasifiers by one component GM nozzles, wherein
 - the supply portion (5) the GM isorate in the GM nozzle (1) does not fall below a minimum value, and
 - that in the adjoining acceleration portion (7) the gasification medium is constantly accelerated and upon exit from the nozzle orifice (6) is concentrated in the focus (11).
2. The method as claimed in claim 1, wherein, in the case of the presence of liquid slag particles or a slag bath in the gasification space, the deepest GM flow thread (13) in the acceleration portion (7), as seen in flow direction against the horizontal (12), is aligned to be horizontal or downwardly inclined.
3. The method as claimed in claim 1, wherein, in the supply portion (5), a minimum GM isorate of 15 to 20 m/s is maintained.
4. The method as claimed in claim 1, wherein, in the acceleration portion (7) the GM isorate is constantly increased by 20 to 200 %.
5. The method as claimed in claim 4, wherein said increase is 50 to 100%.
6. The method as claimed in claim 1, wherein the deepest GM flow thread (13) is inclined downwards by 0 to 30° against the horizontal (12).
7. The method as claimed in claim 6, wherein said incline is 5 to 10°.
8. An apparatus for performing the method of claim 1, wherein the GM nozzle (1) consists of a tubular supply tube (2) with a supply portion (5) which merges into a conical acceleration portion (7), the length of the acceleration portion (7) being 0.5 to 3 times the inside diameter of the supply portion (5).

9. The apparatus of claim 8, wherein the diameter at the beginning of the acceleration portion (7) is smaller than or equal to the diameter of the supply portion (5).
10. The apparatus of claim 8, wherein the cone angle of the acceleration portion (7) is between 5 and 20°.